Amendments to the Claims:

This listing of claims will replace all prior versions, and listing, of claims in the application.

Listing of Claims:

1. (Currently Amended) A 12th active filter capable of concurrently removing 11th and 13th harmonics which is characterized in that a passive filter (7-1) formed of a condenser (7-1-1), an inductance (7-1-2) and a resistor (7-1-3) is formed of the phases (A), (B) and (C), and the passive filter (7-1) of each phase is formed in a three-phase structure in which a switch (7-3) and a voltage source converter (7-4) are connected through a transformer (7-2), and in the voltage source converter (7-4), (V1) ~ (V6) of a firing unit (7-7) are connected with the bases of the transistors of semiconductor devices (V1) ~ (V6), respectively, and a control unit (7-6) connected with a signal detection unit (7-5) is connected with the firing unit (7-7) for thereby removing 11th and 13th harmonics.

2. (Currently Amended) The filter according to claim 1, wherein in said voltage source converter (7-4), a triangle wave passed through a triangle wave generation unit (3-1) by each phase and a signal from the control unit (7-6), namely, a signal obtained by combining the signals from command units (3-3) and (3-4) by a combining unit, are turned on and off.

3. (Currently Amended) The filter according to claim 2, wherein in said comparison unit (3-2), a semiconductor device (V1) and a semiconductor device (V4) passed through an inverter (3-5) are connected with a phase (A), and a semiconductor device (V3) and a semiconductor device (V6) passed through an inverter (3-5) are connected with a phase (B), and a semiconductor device (V5) and a semiconductor device (V2) passed through an inverter (3-5) are connected with a phase (C).

4. (Currently Amended) The filter according to claim 1, wherein in a part of the control unit (7-6), the signals ($V_{11a} \cdot \cos \theta_{11a}$) obtained by vector-combining the value commanded by the command unit (4-1) and the voltage and phase from the signal detection unit

(7-5) are combined by the combining unit (4-2) based on the scalar method, and an error of the same is outputted through a PI control unit (4-3), and the signals ($V_{11a} \cdot sin\ \theta_{11a}$) obtained by vector-combining a sin ($11\,\omega t$) of the frequency conversion unit (4-5) for converting the signal from the PI control unit (4-3) into a 11th frequency, the value multiplied by the multiplier (4-4), the value commanded by the command unit (4-8) and the voltage and phase from the signal detection unit (7-5) are combined by the combining unit (4-2) based on the scalar method, and the combined value is outputted through another PI control unit (4-3), and a (cos ($11\,\omega t$)) of the frequency conversion unit (4-9) adapted to convert the signal from the PI control unit (4-3) into a 11th frequency and a value multiplied by another multiplier (4-4) are combined by the combining unit (4-6) and are outputted to the command unit (3-4).

5. (Currently Amended) The filter according to claim 1, wherein in a part of said control unit (7-6), the signals ($V_{13a} \cdot cos\ \theta_{13a}$) obtained by vector-combining the value commanded by the command unit (5-1) and the voltage and phase from the signal detection unit (7-5) are scalar-combined by the combining unit (5-2), and an error of the same is outputted through the PI control unit (5-3), and the signals ($V_{13a} \cdot sin\ \theta_{13a}$) obtained by vector-combining a sin ($13\,\omega t$) of the frequency conversion unit (5-5) adapted to convert the signal from the PI control unit (5-3) into a 13th frequency, the value multiplied by the multiplier (5-4), the value commanded by the command unit (5-8) and the voltage and phase from the signal detection unit (7-5) are scalar-combined by another combining unit (5-2), and the combined value is outputted through the PI control unit (5-3), and (cos ($13\,\omega t$)) of the frequency conversion unit (5-9) adapted to convert the signal from the PI control unit (5-3) into a 13th frequency, and the value multiplied by another multiplier (5-4) are combined by the combining unit (5-6) and are outputted to the command unit (3-3).

6. (Currently Amended) The filter according to claim 1, wherein in a part of the signal detection unit (7-5), (Va) is inputted into a (FFT), and a 11th harmonic size (V_{13a}), a 13th harmonic size (V_{13a}), a 11th harmonic phase (θ_{11a}), and a 13th harmonic phase (θ_{13a}) are outputted, respectively.